

10/526325
Rec'd PCT/PTR 28 FEB 2005

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property
Organization
International Bureau



(43) International Publication Date
11 March 2004 (11.03.2004)

PCT

(10) International Publication Number
WO 2004/021000 A1

(51) International Patent Classification⁷: G01N 33/53,
33/564, 33/573, C07K 16/40

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(21) International Application Number:
PCT/US2003/027306

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(22) International Filing Date: 29 August 2003 (29.08.2003)

(25) Filing Language: English

(81) Designated States (national): AE, AG, AL, AM, AT, AU,
AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU,
CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,
GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC,
LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW,
MX, MZ, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC,
SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA,
UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(30) Priority Data:
60/407,376 30 August 2002 (30.08.2002) US

(84) Designated States (regional): ARIPO patent (GH, GM,
KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW),
Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM),
European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE,
ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO,
SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM,
GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).



WO 2004/021000 A1

(63) Related by continuation (CON) or continuation-in-part
(CIP) to earlier application:
US 60/407,376 (CIP)
Filed on 30 August 2002 (30.08.2002)

Published:

— with international search report

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

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(54) Title: IMMUNOCAPTURE-BASED MEASUREMENTS OF MAMMALIAN PYRUVATE DEHYDROGENASE COMPLEX

(57) Abstract: The present invention is based on the discovery that an antibody specific for PDH complex can be used to immunoprecipitate PDH complex from a patient sample in an active state. Therefore the anti-PDH complex specific antibody can be used to determine the amount of and/or active state of PDH in a patient sample. The invention immunoassay methods for determining the amount and/or active state of PDH complex present in a patient sample are useful for screening to identify individuals having symptoms indicating malfunction of PDH complex. For example, the invention methods can be used to screen individuals for symptoms of onset of the diabetic state, such as insulitis, and for diagnosing late onset diseases, such as diabetes, Alzheimer's and the like.